

Serial No.: 09/814,495 Confirmation No.: 4599

Applicant: Daniel B. Baer Atty. Ref.: 11564.0034

IN THE CLAIMS:

Please amend the claims to read as follows:

1. (Currently amended) A cooling system for an enclosure containing heat-producing

equipment, said enclosure having air passing therethrough to absorb heat from the equipment and

thereafter exiting the enclosure,

the cooling system comprising an air-to-liquid heat exchanger positioned and adapted to remove

heat from the air exiting the enclosure, wherein the heat exchanger absorbs heat from air exiting

the enclosure and expels the heat outside an the environment containing the enclosure.

2. (Previously amended) The cooling system of claim 1, wherein the heat exchanger further

comprises an air vent, whereby air present in the heat exchanger is expelled when the heat

exchanger is charged with liquid.

3. (Previously amended) The cooling system of claim 1, further comprising a fan situated to

move air through the heat exchanger.

4. (Previously amended) The cooling system of claim 3, wherein the fan is selected from the

group consisting of a centrifugal blower, a cross-flow blower, an axial fan and a plug fan.

5. (Previously amended) The cooling system of claim 3, wherein the heat exchanger and the

fan are attachable to the enclosure.

6. (Previously amended) The cooling system of claim 1, further comprising a valve for

regulating cooling liquid flow through the heat exchanger.

7. (Previously amended) The cooling system of claim 6, further comprising:

a temperature sensor for sensing the temperature of air exiting the heat exchanger; and

a temperature controller coupled to the sensor for modulating the valve in response to the

temperature of the air exiting the enclosure.

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8. (Currently amended) An enclosure containing heat-producing equipment, comprising: an air inlet for admitting air from an environment containing the enclosure, wherein the air absorbs heat from the equipment;

an air outlet for expelling the heated air from the enclosure; and

an air-to-liquid heat exchanger adjacent to the air outlet, the heat exchanger absorbing heat from the heated air <u>exiting the enclosure</u> and expelling the heat outside the environment using a cooling liquid as a heat transfer medium.

- 9. (Previously amended) The enclosure of claim 8, further comprising a fan disposed to force air through the heat exchanger.
- 10. (Previously amended) The enclosure of claim 9, wherein the fan is selected from the group consisting of a centrifugal blower, a cross-flow blower, an axial fan and a plug fan.
- 11. (Previously amended) The enclosure of claim 10, further comprising a modulating valve for regulating cooling liquid flow through the heat exchanger.
- 12. (Currently amended) The enclosure of claim 11, further comprising a temperature sensor sensing temperature of the air exiting the heat exchanger and a temperature controller modulating the valve in response to the temperature exiting the heat exchanger. environment.
- 13. (Previously amended) An enclosure containing heat-producing equipment, comprising: an air inlet for admitting air from an environment containing the enclosure, the air absorbing heat from the equipment,

an air outlet for expelling the air from the enclosure;

means for exchanging heat from the air <u>expelled from the enclosure</u> with a cooling liquid, <u>said means disposed proximate the air outlet;</u>



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whereby the air returns to the environment at a temperature equal to the ambient temperature of the air in the environment.

14. (Previously amended) The enclosure of claim 13, further comprising means for moving the air through the means for exchanging heat.

15. (Cancelled)

16. (Currently amended) A method for cooling an enclosure containing heat-generating equipment, the method comprising:

drawing air into the enclosure from an environment containing the enclosure;

passing the air in the vicinity of the heat-generating equipment to absorb heat from the equipment;

passing the heated air through an air-to-liquid heat exchanger, whereby a cooling liquid absorbs heat from the <u>heated</u> air;

returning the air to the environment containing the enclosure <u>after the cooling liquid has</u> <u>absorbed the heat therefrom;</u> and

rejecting heat from the cooling liquid outside the environment containing the enclosure.

- 17. (Previously amended) The method of claim 16, further comprising modulating cooling liquid flow through the heat exchanger so as to regulate the temperature of the air returned to the environment to the ambient temperature of the environment containing the enclosure.
- 18. (Previously presented) The cooling system of claim 7, wherein the heat exchanger cools the temperature of the air exiting the enclosure to equal the ambient temperature of the air in the environment containing the enclosure.



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19. (Previously presented) The cooling system of claim 12, wherein the heat exchanger cools the temperature of the air exiting the enclosure to equal the ambient temperature of the air in the environment containing the enclosure.